

Offer Reporting of Vegetable Garden Research

Dear College:

In the context of the 'Vegetable garden research 1 'Risk assessment of GenX and PFOA in vegetable crops in Dordrecht, Papendrecht and Sliedrecht. RIVM Letter Report 2018 - 0017 '.

The two research questions were:

- What are concentrations of GenX and PFOA in selected crops from vegetable gardens near the DuPont / Chemours plant?
- Is the allowable daily intake of GenX and PFOA exceeded by consumption of these crops?

At the end of August 2017, RIVM randomly took the DuPont / Chemours samples of vegetables from 10 vegetable gardens: in Dordrecht and Papendrecht at three locations and at four in Sliedrecht. At all locations, samples from three categories of vegetables (leaf, tuber and fruit vegetables) were taken. Traces of GenX and / or PFOA have been found in all the vegetable gardens around the factory, the quantity of which could not be quantified. GenX was detected in 14 percent of the samples around the plant in measurable quantities and in 4 percent of the PFOA samples. At a location less than 1 kilometer northeast of the plant, higher concentrations of GenX were found in vegetables (in endive, beet, celery, lettuce and tomatoes) and PFOA (in beet) than in the other 9 locations around the plant. The highest concentration per type of vegetable is used to calculate whether it is safe to eat crops from vegetable gardens. It is assumed that people will only eat vegetables from their own on a daily basis eat garden. The results are therefore probably higher than the the exposure of GenX and PFOA at vegetable gardeners edge the factory. oatum Under these worst-case conditions, the exposure of 1 March 2018 did not exceed both substances via vegetable vegetables as the quantities that considered (health-based limit values). 0 2312018 M & V / EvS / RvP

The health-based limit values were therefore not exceeded by the consumption of vegetable vegetables. Local residents, however, come into contact with GenX and PFOA via air and drinking water. Therefore, the RIVM advises to consume vegetable crops that have been grown within a radius of 1 kilometer from the farm in moderation (not too often or too much). There, higher concentrations were found. Outside this area, the concentrations are so low that the crops can be safely eaten, in the presence of the known other sources of exposure.

Washing vegetables leads to a lower measured concentration of GenX, but the difference is small. We see no clear difference for PFOA. Washing greens for preparation is sensible in any case and is generally recommended by the Nutrition Center.

The measured concentration of GenX and PFOA in leaves and grass from the exploratory study of the VU were compared with the vegetable garden values. These concentrations are in the same order of magnitude as the concentrations of GenX and PFOA measured in this study. Especially the concentrations in grass corresponded to the concentrations in the vegetable crops. In leaves, the concentrations of GenX and PFOA are slightly higher than in the vegetable crops. In the Continued Verification Examination 2, it was investigated whether residents with higher PFOA blood levels came into contact with other sources of PFOA. The participants themselves indicated that food from the vegetable garden could possibly be a fuel. This kitchen garden research shows that the vegetable garden can indeed have been (or was) a source of PFOA. Because there were relatively few participants (14) and their kitchen garden consumption was not determined, it is not possible to establish a relationship. You have asked us to perform oak phase two of the research plan. The results of the vegetable garden research (phase 1) will therefore not change. The analysis of ground and water samples will provide more insight into the possible route of the contamination of the vegetables with GenX and / or PFOA. From this it is clear whether the ground on which the crops are grown is suitable for use in the garden. The National Institute for Public Health and the Environment (RIVM) will have the analyses of soil and (irrigation) water samples carried out and will inform you of the results and their significance by letter at the beginning of May. Transmitter counter notification will inform the RIVM four weeks after the date of this letter of the letter report and spread it in a broader circle. 2 Further analysis sources of PFOA. An exploratory investigation. Appendix to RIVM letter 157/2017 M & V / EvS / RvP.

If this letter report can be released sooner, we request that you inform the undersigned as soon as possible. Date March 1, 2018

Sincerely, (, _ ' - : _ ... , Our reference 023/2018 M & V / EvS / RvP \ ' ... _ .. - (' Dr. Els C.M. from Schie Director Environment & Safety